

APPENDIX

1. (Amended) A video classification system comprising:

a story segment identifier ~~that processes~~for processing a video stream and ~~partitions~~partitioning the video stream into a plurality of story segments, and ~~produces~~said story segment

5 identifier producing one or more key frames ~~that are associated~~ with each story segment of the plurality of story segments,; and

a classifier, operably coupled to the story segment identifier, ~~that associates~~for associating one or more classifications to each story segment of the plurality of story
10 segments, to facilitate a selection among the plurality of story segments based on the one or more classifications.

2. (Amended) The video classification system ~~of~~as claimed in claim 1, wherein:

the video stream includes an associated text stream~~,~~;

the story segment identifier partitions the text stream
5 into an at least one text segment corresponding to at least one ~~each~~ story segment of the plurality of story segments,; and

the classifier associates the one or more classifications to the at least one ~~each~~ story segment based on the at least one text segment.

3. (Amended) The video classification system ~~of~~ as claimed in claim 1, wherein:

the video stream includes an associated audio stream~~,~~;

the story segment identifier partitions the audio stream
5 into ~~an~~ at least one audio segment corresponding to at least one
~~each~~ story segment of the plurality of story segments~~,~~; and

the classifier associates the one or more classifications
to the at least one ~~each~~ story segment based on the at least one
audio segment.

4. (Amended) The video classification system ~~of~~ as claimed in claim 3, wherein:

the classifier includes a converter ~~that converts~~ for
converting the at least one audio segment into ~~an~~ at least one text
5 segment~~,~~ and the classifier ~~associates~~ associating the one or more
classifications to the at least one ~~each~~ story segment based on the
at least one text segment.

5. (Amended) The video classification system ~~of~~ as claimed in claim 1, wherein the video classification system further
~~including~~ includes:

a visual characterizer, operably coupled to the story
5 segment identifier and the classifier ~~that provides,~~ for providing
a visual characterization of at least one ~~each~~ story segment of the

plurality of story segments based on an image content of the at least one each story segment,~~;~~; and wherein

the classifier associates the one or more classifications
10 to the at least one ~~each~~ story segment based on the visual characterization.

6. (Amended) The video classification system ~~of~~as claimed in claim 5, wherein the visual characterizer includes:

a figure recognizer ~~that recognizes~~for recognizing a
recognized figure from a plurality of recognizable figures based on
5 the image content,~~;~~; and wherein

the visual characterizer characterizes the at least one
~~each~~ story segment based on the recognized figure.

7. (Amended) The video classification system ~~of~~as claimed in claim 5, wherein the visual characterizer includes at least one of: a text recognizer, a figure recognizer, and a flesh tone recognizer.

8. (Amended) The video classification system ~~of~~as claimed in claim 1, wherein the story segment identifier partitions the video stream based on at least one of a recognized figure, a recognized scene, a video cut, and a detected commercial.

9. (Amended) The video classification system ~~of~~as claimed in claim 1, wherein the one or more classifications include at least one of: program type, news type, media, person, locale, popularity, and keyword.

10. (Amended) The video classification system ~~of~~as claimed in claim 1, wherein each story segment of the plurality of story segments include one or more scenes, and the one or more key frames correspond to a frame within each of the one or more scenes.

11. (Amended) The video classification system ~~of~~as claimed in claim 1, wherein the one or more key frames are determined based upon a transform of an encoding of the ~~each~~ story segment of the plurality of story segments.

12. (Amended) The video classification system ~~of~~as claimed in claim 11, wherein the transform includes a discrete cosine transform, and the encoding is ~~in~~an MPEG encoding.

13. (Amended) The video classification system ~~of~~as claimed in claim 1, wherein the video stream is communicated from at least one of: an analog signal broadcast, a digital signal broadcast, a satellite broadcast, a cable broadcast, an Internet connection, a
5 recorder device, and a playback device.

14. (Amended) The video classification system ~~of~~ as claimed in
claim 1, wherein said video classification system further
~~including~~ includes:

5 a storage device ~~that stores~~ for storing the plurality of
story segments.

15. (Amended) The video classification system ~~of~~ as claimed in
claim 14, wherein the storage device is at least one of: a VCR, a
DVD, a DVR, a CD-R/W, and a computer memory.

16. (Amended) The video classification system ~~of~~ as claimed in
claim 1, wherein at least one of the one or more key frames is a
video clip.

17. (Amended) A retrieval system for retrieving story segments
of a plurality of story segments based on one or more
classifications associated with each story segment of the plurality
of story segments, the retrieval system comprising:

5 a filter ~~that identifies~~ for identifying one or more
filtered story segments of the plurality of story segments based on
the one or more classifications that are associated with each story
segment, and

a. presenter, operably coupled to the filter, ~~that for~~
10 sequentially ~~presents~~ presenting one or more key frames ~~that are~~
associated with the one or more filtered story segments on a
display.

18. (Amended) The retrieval system ~~of~~ as claimed in claim 17,
wherein:

the filter includes a sorter ~~that associates~~ for
associating a ranking to each story segment based on a correlation
5 of the one or more classifications to one or more preferences;
and

the one or more filtered story segments are identified
based on the ranking associated with each story segment.

19. (Amended) The retrieval system ~~of~~ as claimed in claim 18,
wherein:

the presenter presents the one or more key frames in
dependence upon the ranking associated with each story segment.

20. (Amended) The retrieval system ~~of~~ as claimed in claim 18,
wherein said retrieval system further including includes:

a profiler ~~that produces~~ for producing the one or more
preferences.

21. (Amended) The retrieval system ~~of~~ as claimed in claim 17, wherein the one or more classifications include at least one of: program type, news type, media, person, locale, popularity, and keyword.

22. (Amended) The retrieval system ~~of~~ as claimed in claim 17, wherein said retrieval system further ~~including~~ includes:

a player, operably coupled to the presenter, ~~that~~ presents for presenting a selected story segment of the one or more
5 filtered story segments based upon the one or more key frames that are presented on the display at a time when a user effects a selection.

23. (Amended) The retrieval system ~~of~~ as claimed in claim 22, wherein the player also presents a portion of each of the one or more filtered story segments sequentially.

24. (Amended) The retrieval system ~~of~~ as claimed in claim 17, wherein said retrieval system further ~~including~~ includes:

a storage device for storing the plurality of story segments.

25. (Amended) The retrieval system ~~of~~ as claimed in claim 24,
wherein the storage device is at least one of: a VCR, a DVR, a CD-
R/W, and a computer memory.

26. (Amended) The retrieval system ~~of~~ as claimed in claim 17,
wherein:

the presenter also presents at least one of: one or more
portions of an audio segment and one or more portions of a text
5 segment that are associated with the one or more filtered story
segments.

27. (Amended) A video device comprising:

a classification device ~~that classifies~~ for classifying a
plurality of segments of a video stream by producing a
classification based on at least one of text, audio, or visual
5 information associated with each segment of the plurality of
segments, ~~;~~ and

a retrieval device ~~that facilitate~~ for facilitating a
selection of ~~an~~ at least one ~~each~~ segment of the plurality of
segments by matching the classification of the at least one ~~each~~
10 segment of the plurality of segments to ~~an~~ at least one user
preference, and by presenting ~~an~~ at least one key frame of the at
least one ~~each~~ segment of the plurality of segments on a display.

28. (Amended) The video device ~~of~~ as claimed in claim 27,
wherein said video device further includingincludes:

5 a player ~~that communicates~~for communicating the at least
one ~~each~~ segment of the video stream to the display ~~-based on the~~
selection of the at least one ~~each~~ segment.

29. (Amended) The video device ~~of~~ as claimed in claim 27,
wherein said video device further includingincludes:

a storage device ~~that stores~~for storing the plurality of
segments.

30. (Amended) The video device ~~of~~ as claimed in claim 27,
wherein the video device is at least one of: a television, a set-
top box, a video recorder, a computer, and a palm-top device.

31. (Amended) The video device ~~of~~ as claimed in claim 27,
wherein the video device further includingincludes:

5 a pre-filter ~~that filters~~for filtering a multi-channel
input to provide the video stream based on the at least one user
preference.

32. (Amended) The video device ~~of~~ as claimed in claim 31,
wherein the pre-filter filters the multi-channel input based on a
program guide.

33. (Amended) A user interface for retrieving a selected segment of a plurality of segments of a video stream, said user interface comprising:

a—means for rendering one or more key frames associated
5 with one or more segments of the plurality of segments~~—;~~; and

a—means for selecting the selected segment based on the rendering of the one or more key frames.

34. (Amended) The user interface ~~of claim~~as claimed in claim
33, wherein said user interface further ~~including~~comprises:

a—means for identifying one or more user preferences~~—;~~;
and wherein:

5 the means for rendering the one or more key frames
includes:

a—means for determining a comparison between a classification of each segment of the plurality of segments and the one or more user preferences~~;~~; and wherein

10 the rendering of the one or more key frames is dependent upon the comparison.

35. (Amended) The user interface ~~of claim~~as claimed in claim
34, wherein:

the means for rendering the one or more key frames includes one or more panes on the display, ~~and~~ and

5 the one or more key frames associated with each of the one or more segments are displayed sequentially in the one or more panes.

36. (Amended) The user interface ~~of~~ as claimed in claim 35, wherein:

the means for selecting the selected segment includes a means for indicating a selection of a selected pane of the one or
5 more panes, ~~such that~~ whereby the selected segment corresponds to a one of the one or more segments that is associated with the one or more key frames being displayed in the selected pane.

37. (Amended) The user interface ~~of claim~~ as claimed in claim 33, wherein said user interface further including comprises:

a means for rendering the selected segment on the display.

38. (Amended) The user interface ~~of~~ as claimed in claim 37, wherein said user interface further ~~including comprises:~~

a rendering control for receiving render mode options, ~~and~~
and

5 a means for rendering portions of each segment of the plurality of segments in dependence upon the render mode options.

39. (Amended) The user interface ~~of claim~~as claimed in claim
33, wherein the means for selecting the selected segment includes
at least one of: a pointing device, a voice recognition system, a
gesture recognition system, and a keyboard.

40. (Amended) The user interface ~~of claim~~as claimed in claim
33, wherein the means for rendering the one or more key frames of
the plurality of segments includes a multi-dimensional presentation
of at least one of: the one or more key frames, one or more user
5 preferences, and one or more user options.